PERMIT NO. HI 0000353

AUTHORIZATION TO DISCHARGE UNDER THE NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM

In compliance with the provisions of the Clean Water Act, as amended, (33 U.S.C. 1251 et seq.; the "Act") and Hawaii Revised Statutes, Chapter 342D, and Hawaii Administrative Rules, Chapters 11-54 and 11-55, , Department of Health (Department), State of Hawaii

KAUAI ISLAND UTILITY COOPERATIVE

(hereinafter "PERMITTEE"),

is authorized to discharge once-through condenser cooling waters through Outfall Serial No. 001, and storm water runoff through Outfall Serial Nos. 002, 003, 004, and 005, at the coordinates and to the receiving waters listed below:

Outfall Serial No.	Coordinates		Receiving Waters
	Latitude	Longitude	
001	21°54'06"N	159°35'18"W	Port Allen Bay, Pacific Ocean
002	21°54'10"N	159°35'20"W	Hanapepe Bay, Pacific Ocean
003	21°54'08"N	159°35'12"W	Port Allen Bay, Pacific Ocean
004	21°56'20"N	159°35'13"W	Port Allen Bay, Pacific Ocean
005	21°54'09"N	159°35'16"W	Port Allen Bay, Pacific Ocean

from its Port Allen Generating Station,

located at 261 Akaula Street, Eleele, Kauai, Hawaii,

in accordance with the effluent limitations, monitoring requirements and other conditions set forth herein, and in the attached Department "Standard NPDES Permit Conditions," dated December 30, 2005.

All references to Title 40 of the Code of Federal Regulations (CFR) are to regulations that are in effect on July 1, 2004, except as otherwise specified. Unless otherwise specified herein, all terms are defined as provided in the applicable regulations in Title 40 of the CFR.

This permit, including the Zone of Mixing, will become effective **_____.**

This permit, including the Zone of Mixing, and the authorization to discharge will expire at midnight, March 31, 2011.

Signed this __th day of _____, 2006.

_____
(For) Director of Health

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STANDARD NPDES PERMIT CONDITIONS (ATTACHED)

A. EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS

During the period beginning with the effective date of this permit and lasting through March 31, 2011, the Permittee is authorized to discharge from **Outfall Serial Nos. 001, 002, 003**, **004 and 005.**

1. The discharge of once-through cooling water effluent from **Outfall Serial No. 001** in excess of the following limits is prohibited.

   a. Such discharges shall be limited and monitored as specified below (Based upon a total rated generating capacity of 41.4 MW:

Effluent Characteristics	Discharge Limitations			Monitoring Requirements	
	Monthly Average	Daily Maximum	Units	Measurement Frequency	Sample Type
Flow	a	16.2	MGD	Continuous/ Recorder[b]	N/A
Temperature	104.0^{o}	110.0^{o}	^{o}F	Continuous	Continuous
	40.0^{o}	43.3^{o}	^{o}C	Continuous	Continuous
Oil and Grease	N/A	c	mg/l	Once/Quarter	Grab
Total Nitrogen (ug N/L)	N/A	a	ug/l	Once/Quarter	Grab
Ammonia Nitrogen (ug NH_4-N/L)	N/A	a	ug/l	Once/Quarter	Grab
Nitrate + Nitrite Nitrogen (ug [NO_3+NO_2]-N/L)	N/A	a	ug/l	Once/Quarter	Grab
Total Phosphorus (ug P/L)	N/A	a	ug/l	Once/Quarter	Grab
pH	N/A	a	pH Unit	Once/Quarter	Grab
Salinity	N/A	a	ppt	Once/Quarter	Grab
Silica (ug Si/L)	N/A	a	ug/l	Once/Quarter	Grab
Whole-Effluent Toxicity	70% mean fertilization (or equivalent chronic test endpoint) in 100% effluent			Once/Quarter[b]	Grab

N/A - Not Applicable
a - Monitoring and reporting required, no limitations at this time.
b - Once-through condenser cooling water may be monitored as cited in Section 3.b of the Standard NPDES Permit Conditions provided that the results are representative of the discharge flow.
c - The detection of oil and grease shall be a violation of Section 1.b of the Standard NPDES Permit Conditions.

b. There shall be no discharge of polychlorinated biphenyl compounds, such as those commonly used for transformer fluid at any time.

c. There shall be no discharge of chlorine at any time.

d. There shall be no discharge of pollutants from water clarification and water softening treatment at any time.

e. There shall be no discharge of compounds used in closed-loop systems.

f. The discharge of the following wastewaters/pollutants is prohibited:

1. Low Volume Wastes,
2. Fly Ash and Bottom Ash,
3. Metal Cleaning Wastes, and
4. Chemical Metal Cleaning Wastes.

g. Samples taken in compliance with the monitoring requirements shall be taken at the following location:

Condenser Cooling Water and Whole-Effluent Toxicity:
Outfall Serial No. 001.

h. The Permittee shall conduct the effluent sampling on the same day that the receiving water monitoring is conducted unless inclement weather or hazardous conditions exist which may endanger the lives of the Permittee's personnel.

i. Whole-Effluent Toxicity Monitoring

Whole-Effluent Toxicity Monitoring shall be conducted in accordance with the provisions of Part B of this permit.

2. Effluent Limitations and Monitoring Requirements for Storm Water Runoff discharged from **Outfall Serial Nos. 002, 003, 004 and 005**.

a. Storm Water Pollution Control Plan (SWPCP)

The Permittee shall:

(1) The Permittee shall continue to implement a SWPCP dated June 21, 2002, and subsequent submittals (if applicable) until the Permittee develops and submits the updated SWPCP to the Director of Health (Director).

(2) Submit an updated SWPCP to the Director within 90 days after the effective date of this permit.

(3) Implement the updated SWPCP upon its submittal to the Director.

(4) Review and update the SWPCP, as often as needed toward improving the storm water discharge quality and/or control practices, or, as required by the Director.

(5) Report any changes or amendments to SWPCP to the Director within 30 days from the date the changes were made.

(6) Maintain a copy of the SWPCP and documentation of all amendments, as applicable, at the facility.

b. Samples shall be collected from a discharge resulting from a representative storm. A representative storm means a rainfall that accumulates more than 0.1 inch of rain and occurs at least 72 after the previous measurable (greater than 0.1 inch) rainfall.

c. For storm water monitoring in accordance with Parts A.2.d and A.2.e, only:

"Grab sample" means a sample collected during the first 15 minutes of the discharge.

"Composite sample" means a combination of at least two (2) sample aliquots, collected at periodic intervals. The composite must be flow proportional; either the time interval between each aliquot or the volume of each aliquot must be proportional to either the flow at the time of sampling or total flow since the collection of the previous aliquot. Aliquots may be collected manually or automatically.

Samples for analysis shall be collected during the first 15 minutes of the discharge and at 15-minute intervals thereafter for the duration of the discharge, as applicable. If the discharge lasts for over an hour, sample collection may cease.

d. Monitoring Methods

(1) Conduct monitoring in accordance with test procedures approved under 40 CFR Part 136, or unless otherwise specified, with detection limits low enough to measure compliance with the discharge limitations specified in Part A.2.e. For cases where the discharge limitation is below the lowest detection limit of the appropriate test procedure, the Permittee shall use the test method with the lowest detection limit.

(2) The Director may specify additional monitoring requirements and limitations, in addition to the monitoring requirements specified in Part A.2.e of this permit.

e. Such storm water runoff associated with industrial activity shall be limited and monitored as follows:

MINIMUM MONITORING REQUIREMENTS			
Parameter	Discharge Limitation {1}	Measurement Frequency	Sample Type
Flow (MGD)	{2}	Annually or Estimated	Calculated
Biochemical Oxygen Demand (5-Day) (mg/l)	{2}	Annually	Composite {3}
Chemical Oxygen Demand (mg/L)	{2}	Annually	Composite {3}
Total Suspended Solids (mg/L)	{2}	Annually	Composite {3}
Total Phosphorus (mg P/L)	{2}	Annually	Composite {3}
Total Nitrogen (mg N/L)	{2}	Annually	Composite {3}
Nitrate + Nitrite Nitrogen (ug(N03+N02)-N/L	{2}	Annually	Composite {3}
Oil and Grease	15 mg/l	Annually	Grab
pH Range {3} (Standard Unit)	7.0 to 8.6	Annually	Grab
Total Recoverable Lead	140 ug/l	Annually	Composite {3}
Total Recoverable Copper	3 ug/l	Annually	Composite {3}
Total Recoverable Arsenic	69 ug/l	Annually	Composite {3}

{1} Pollutant concentration levels shall not exceed the effluent limits or be outside the ranges indicated in the above table. Actual or measured levels which exceed those effluent limits or are outside those ranges shall be reported to the Director as required in Part D of this permit.

{2} No Limitation at this time. Only monitoring and reporting required.

{3} The following shall apply for this storm water sample only. If the duration of the discharge event is less than 30 minutes, the sample collected during the first 15 minutes of the discharge shall be analyzed and reported toward the fulfillment of this composite sample specification. If the duration of the discharge event is greater than 30 minutes, the Permittee shall analyze two (2) or more sample aliquots as a composite sample in accordance with Part A.2.c of this permit.

B. WHOLE-EFFLUENT TOXICITY REQUIREMENTS

1. Chronic Toxicity

The Permittee shall conduct quarterly chronic toxicity tests on grab samples.

a. Test Species and Methods

The Permittee shall conduct quarterly tests with the tropical sea urchin, *Tripneustes gratilla*, using the following methods. The Permittee shall use updated versions of these methods as they become available:

(1) Hawaiian Collector Urchin, *Tripneustes gratilla* (Hawa'e) Fertilization Test Method (Adapted by Amy Wagner, U.S. EPA, Region 9 Laboratory, Richmond, CA from a method developed by George Morrison, U.S. EPA Naragansett, RI and Diane Nacci, Science Applications International Corporation, ORD Naragansett, RI), 1998.

Important information for conducting this method (e.g., test acceptability criteria, data analysis, etc.), can be found in the *Arabacia punctulata* section of Short-Term Methods for Estimating the Chronic Toxicity of Effluent and Receiving Waters to Marine and Estuarine Organisms (EPA-821-R-02-014, October 2002 or subsequent editions).

(2) If the locally available species, *Tripneustes gratilla*, becomes unavailable, and/or is determined by the Department and EPA Region 9 to be unsuitable for whole-effluent toxicity testing the Permittee, upon obtaining written approval from the Director, may conduct chronic toxicity testing on one (1) mainland species found in the EPA Methods manual referenced below:

Short-Term Methods for Estimating the Chronic Toxicity of Effluent and Receiving Waters to West Coast Marine and Estuarine Organims (EPA-600-R-95-136, August 1995 or subsequent editions).

b. Definition of Toxicity

(1) Whole Effluent Toxicity Limitation: Toxicity is defined as less than 70% mean fertilization, or equivalent chronic test endpoint, in 100% effluent.

(2) Because effluent dilutions are not required for this testing, 100% effluent shall be tested with a seawater control (and brine control, if necessary). A t-test should be conducted to determine a statistically significant difference between the seawater and brine control.

c. Quality Assurance

(1) Concurrent testing with reference toxicants shall be conducted.

(2) Reference toxicant tests shall be conducted using the same test conditions as effluent toxicity tests (i.e., same test duration, etc.).

(3) If either the reference toxicant tests or the effluent tests do not meet all test acceptability criteria as specified in the test methods, then the Permittee must re-sample and re-test within 14 days.

(4) Control and dilution water should be receiving water or lab seawater, as described in the test methods. To maintain acceptable salinity when conducting tests with *Tripneustes gratilla*, effluent dilutions can be adjusted by adding hypersaline brine/GP2 salts and a second control using brine shall also be tested.

2. Toxicity Reduction Evaluation

a. Preparation of Initial Investigation Toxicity Reduction Evaluation (TRE) Workplan

The Permittee shall (re)submit to the Director and USEPA an initial investigation TRE workplan (approximately 1-2 pages) within 90 days of the effective date of this permit. This workplan shall describe steps which the Permittee intends to follow in the event that toxicity (i.e., exceedence of whole-effluent toxicity limitation) is detected, and should include at minimum:

(1) A description of the investigation and evaluation techniques that would be used to identify potential causes/sources of toxicity, effluent variability, treatment system efficiency;

(2) A description of the facility's method of maximizing in-house treatment efficiency, good housekeeping practices, and a list of all chemicals used in operation of the facility;

(3) Identification of the organization (e.g., contract laboratory, etc.) that will conduct the evaluation if a toxicity identification evaluation (TIE) becomes necessary.

b. Additional (Accelerated) Toxicity Testing

(1) If the Permittee violates the whole-effluent toxicity limitation, the Permittee, at a minimum, shall conduct six (6) additional tests: one (1) approximately every 14 days, over a 12-week period (or as applicable for more than six (6) tests). Effluent sampling for the first test of the six (6) additional tests shall commence within approximately

24 hours of receipt of the test results exceeding the toxicity discharge limitation.

(2) The Permittee shall continue the additional toxicity testing required by Part B.2.b.(1) of this permit until the Permittee has complied with the whole-effluent toxicity limitation six (6) consecutive times. Then the Permittee may return to the normal sampling frequency required in Part B.1 of this permit.

(3) However, *if implementation of the initial investigation TRE workplan indicates the source of the toxicity* (e.g., a temporary plant upset, etc.), then the Permittee shall conduct only the first test of the six (6) additional tests required above. If toxicity (as defined) is not detected in this first test, the Permittee may return to the normal sampling frequency required in Part B.1 of this permit. If toxicity (as defined) is detected in this first test, then Part B.3 of this permit shall apply.

(4) If a Toxicity Reduction Evaluation/Toxicity Identification Evaluation (TRE/TIE) is initiated prior to completion of the accelerated testing schedule required in Part B.2.b.(2) of this permit, then accelerated testing may be terminated, or used as necessary in performing the TRE/TIE, as determined by the Director and USEPA. At that time, the Permittee shall resume regular quarterly toxicity testing . This regular toxicity testing shall use, as directed by the Director and USEPA, either *Tripneustes gratilla* or a species in the most recent edition of USEPA's Short Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to West Coast Marine and Estuarine Organisms.

3. Toxicity Reduction Evaluation/Toxicity Identification Evaluation (TRE/TIE)

a. If toxicity (as defined) is detected in any of the six (6) additional tests, then, based on an evaluation of the test results and additional available information, the Director and USEPA may determine that the Permittee shall initiate a TRE, in accordance with the Permittee's initial investigation TRE workplan and Toxicity Reduction Evaluation Guidance for Municipal Wastewater Treatment Plants (EPA 833-B-99-002, 1999). Moreover, the Permittee shall develop a detailed TRE workplan which includes:

(1) Further actions to investigate/identify the cause(s) of toxicity;

(2) Actions the Permittee has taken/will take to mitigate the impact of the discharge, to correct the noncompliance, and to prevent the recurrence of toxicity;

(3) A schedule under which these actions will be implemented;
and shall submit this workplan to the Director and USEPA for approval.

b. As part of this TRE process, the Permittee may initiate a TIE using the test methods manuals, EPA/600/6-91/005F (Phase I freshwater),

EPA/600/R-96/054 (Phase I; marine), EPA/600/R-92/080 (Phase II), and EPA/600/R-92/081 (Phase III), to identify the cause(s) of toxicity.

c. If a TRE/TIE is initiated prior to completion of the accelerated testing schedule required by Part B.2.b(2) of this permit, then, upon approval by the Director and USEPA, the accelerated testing schedule may be modified or used as necessary in performing the TRE/TIE.

4. Reporting

a. The Permittee shall submit a full report of toxicity test results, including any toxicity testing required by Parts B.2.b and B.3 of this permit, with the Discharge Monitoring Report in accordance with Part D.1 of this permit for the quarter or month (when Parts B.2.b and/or B.3 is/are applicable) in which the toxicity tests are conducted. A full report shall consist of: (1) toxicity test results, including calculated sperm to egg ratio; (2) dates of sample collection and initiation of each toxicity test; and (3) whole effluent toxicity limitation. Toxicity test results shall be reported according to the test methods manual chapter on Report Preparation.

b. Any violation of the whole-effluent toxicity limitation shall be reported in accordance with Part D.2 of this permit.

c. If the initial investigation TRE workplan is used to determine that additional (accelerated) toxicity testing is not required, in accordance with Part B.2.b(3) of this permit, then these results shall be submitted with the DMR for the month in which investigations conducted under the TRE workplan occurred.

d. Within 14 days of receipt of test results exceeding the whole effluent toxicity limitation, the Permittee shall provide written notification to the Director and USEPA:

(1) Findings of the TRE or other investigation to identify the cause(s) of toxicity;

(2) Actions the Permittee has taken/will take, to mitigate the impact of the discharge and to prevent the recurrence of toxicity;

(3) When corrective actions, including a TRE, have not been *completed*, a schedule under which corrective actions will be implemented; or

(4) The reason for not taking corrective action, if no action has been taken.

5. Reopener

This permit may be modified, in accordance with 40 CFR122 and 124, to include conditions or limits to address demonstrated effluent toxicity based on newly available information.

C. ZONE OF MIXING (ZM-58)

The establishment of this ZM-58 is subject to the following conditions:

1. The Zone of Mixing granted will be the water area designated as only that portion of Port Allen Bay of the Pacific Ocean off the Kauai coastline which falls within a boundary defined by an arc of radius 2,000 feet originating from Outfall Serial No. 001 at coordinates: Latitude 21°54'06"N and Longitude 159°35'18"W. The area of the Zone of Mixing shall be subject to a western boundary defined by a line which coincides with the position of the Port Allen breakwater. (See Figure 3: U.S. Department of Commerce, National Oceanic and Atmospheric Administration, National Ocean Survey sectional map for delineation of the Zone of Mixing.)

2. The Zone of Mixing granted is only for the assimilation of once through condenser cooling water discharged from Outfall Serial No. 001. Other chemical entities, including but not limited to slimicide and biocides are prohibited.

3. The discharge from Outfall Serial No. 001 shall comply with water quality standards set forth in Chapter 11-54, Hawaii Administrative Rules (2000), including basic water quality criteria, except that the specific water quality criteria set forth in the table below may be exceeded within the Zone of Mixing.

   "Class A" "Wet" "Open Coastal Water"

Parameter	Geometric mean not to exceed the given value	Not to exceed the given value more than 10% of the time	Not to exceed the given value more than 2% of the time
Total Nitrogen	150.00	250.00	350.00
Ammonia Nitrogen (ug NH4-N/L)	3.50	8.50	15.00
Nitrate + Nitrite Nitrogen (ug (NO3 + N02)-N/L)	5.00	14.00	25.00
Total Phosphorus	20.00	40.00	60.00
Chlorophyll a	0.30	0.90	1.75

   pH (Standard Units) - pH shall not deviate more than 0.5 units from a value of 8.1, except at coastal locations where and when freshwater from stream, stormdrain, or groundwater may depress the pH to a minimum level of 7.0.

   Temperature - shall not vary more than 1°C from "ambient conditions".

   Salinity - shall not vary more than 10 % from natural or seasonal changes considering hydrologic input and oceanographic factors.

4. Receiving Water Monitoring Requirements

A total of 10 stations within and along the Zone of Mixing shall be monitored as noted below and the results included with the monthly Discharge Monitoring Reports.

The location of the monitoring stations shall be: two(2) at 100 feet radius from the discharge point; two (2) at 500 feet radius from the discharge point; two (2) at 1,000 feet radius from the discharge point; two (2) at 1,500 feet radius from the discharge point; and two (2) along the edge of the Zone of Mixing. Top, middle, and bottom samples of the monitoring stations water columns greater than 10 meter in depth shall be taken. At monitoring stations with water depths equal to or less than 10 meters, top and bottom samples of the water column shall be taken. Note: Top is one (1) meter below the ocean surface; middle is mid depth; and bottom is one (1) meter above ocean bottom. An acceptable method to locate the positions of the monitoring stations shall be utilized.

It shall be a violation of this permit if the monitoring results exceed the specific criteria for open coastal waters in Part C.3 at the boundary of or outside the Zone of Mixing.

The Permittee shall conduct the receiving water monitoring on the same day that the effluent monitoring is conducted unless inclement weather or hazardous conditions exist which may endanger the lives of the Permittee's personnel.

Sample shipment and storage procedures prior to analysis shall be in accordance with acceptable quality assurance/quality control specifications.

The receiving water shall be monitored as specified below:

Parameter	Type of Sample	MONITORING FREQUENCY Zone of Mixing Stations	MONITORING FREQUENCY Control Stations
Total Nitrogen (ug N/L)	Grab	Once/Quarter	Once/Quarter
Ammonia Nitrogen (NH^4-N/L)	Grab	Once/Quarter	Once/Quarter
Nitrate + Nitrite Nitrogen (ug (NO_3+NO_2)-N/L)	Grab	Once/Quarter	Once/Quarter
Total Phosphorus (ug P/L)	Grab	Once/Quarter	Once/Quarter
Chlorophyll a (ug/L)	Grab	Once/Quarter	Once/Quarter
pH (pH Units)	Grab	Once/Quarter	Once/Quarter

Temperature (°C)	Grab	Once/Quarter	Once/Quarter
Salinity (ppt)	Grab	Once/Quarter	Once/Quarter
Silica (ug Si/L)	Grab	Once/Quarter	Once/Quarter

5. Beginning the effective date of this permit, the receiving water bottom biological communities shall be monitored at least once per year. The monitoring performed shall include the diversity and distribution of the bottom biological communities. On January 28th of each year, a report summarizing the bottom biological communities monitoring performed during the past twelve months shall be submitted to the Department of Health. For the first calendar year of permit issuance, the associated report shall summarize the biological communities monitoring performed during the remaining months in the year, upon obtaining program approval. A program of research to develop reasonable alternatives to the methods of treatment or control in use may be required if research is deemed prudent by the Director. This monitoring requirement may be waived upon demonstrating to the Director, with the concurrence of the U.S. Environmental Protection Agency that: the discharge does not impact the existing bottom biological communities; or, no bottom biological communities exist in the receiving water.

D. REPORTING REQUIREMENTS

1. Transmittal and Monitoring Results Reporting Requirements

   a. Certification of Transmittals

      Submit all information in accordance with HAR, Section 11-55-07(b), with the following certification statement by an appropriate signatory:

      "I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine or imprisonment for knowing violations."

   b. Include "NPDES Permit No. **HI 0000353**" on each transmittal.

      Failure to provide the assigned permit number for this facility on future correspondence or transmittals may be a basis for delay of the processing of the document(s).

   c. Reporting of Discharge and Monitoring Results

      (1) Monitoring results shall be reported on a DMR form (EPA No. 3320-1). The results of all monitoring required by this permit shall be submitted in a format which allows direct comparison with the limitations in Part A and other requirements of this permit.

      (2) Monitoring reports shall be postmarked no later than the 28th day of the month following the completed reporting period.

      (3) Should there be no discharges during the monitoring period, the DMR form shall so state.

   d. Additional Monitoring by the Permittee

      If the Permittee monitors any pollutant at location(s) designated herein more frequently than required by this permit, using approved analytical methods as specified in 40 CFR Part 136, the results of such monitoring shall be included in the calculation and reporting of the values required in the discharge monitoring report form. The increased frequency shall also be indicated.

e. Reports Submittal

Duplicate signed copies of monitoring and all other reports required by this permit, shall be submitted to the Regional Administrator and the Director at the following addresses or as otherwise specified:

Regional Administrator
U.S. Environmental Protection Agency
Region 9
Water Division
CWA Compliance Office, WTR-7
75 Hawthorne Street
San Francisco, CA 94105

Director of Health
Department of Health
Environmental Management Division
Clean Water Branch
919 Ala Moana Boulevard
Room 301
Honolulu, HI 96814-4920

2. Reporting of Noncompliance, Unanticipated Bypass, or Upset

In case of conflict between the conditions stated here and those in the "Standard NPDES Permit Conditions" the more stringent conditions shall apply.

a. 24 Hour Reporting

(1) The Permittee or its duly authorized representative (40 CFR 122.22) shall orally report any noncompliance within 24 hours (except if immediate reporting under Part D.2.b is required) of the time the Permittee or its duly authorized representative becomes aware of the circumstances. The following shall be included, but not limited to, as information which must be reported within 24 hours under this paragraph.

(A) Any unanticipated bypass.

(B) Any upset.

(C) Violation of a maximum daily discharge limitation specified in Part A of this permit.

(2) Oral Reporting

The Permittee or its duly authorized representative shall provide oral reports by telephone to the Clean Water Branch at (808) 586-4309 during regular office hours. Outside of regular office hours, the Permittee or its duly authorized representative shall report orally to the Hawaii State Hospital Operator at (808) 247-2191.

(3) Written Reporting

A written submission shall also be provided within five (5) days of the time the Permittee becomes aware of the circumstances. The written submission shall contain:

(A) A description of the noncompliance and its cause;

(B) The period of noncompliance, including exact dates and times;

(C) If the noncompliance has not been corrected, the anticipated time it is expected to continue; and

(D) Steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.

The Director may waive the written report on a case-by-case basis if the oral report has been received within 24 hours.

b. Immediate Reporting

The Permittee or its duly authorized representative shall immediately report any noncompliance or discharge which may endanger health or the environment. Incidences of endangering noncompliance or discharge shall be reported orally as described above in Part D.2.a.(2) from the time the Permittee or its duly authorized representative becomes aware of the circumstances. The Permittee or its authorized representative shall also provide a written submission as described above in Part D.2.a.(3). The Director may waive the written report on a case-by-case basis.

3. Planned Changes

Any planned physical alterations or additions to the permitted facility, not covered by Standard Condition 16.a.(1), (2) or (3) shall be reported to the Director on a quarterly basis.

4. Types of Sample

a. "Grab sample" means an individual sample collected at a randomly-selected time over a period not exceeding 15 minutes.

b. "Composite sample" means a combination of at least eight (8) sample aliquots, collected at periodic intervals during the operating hours of facility over a 24-hour period. The composite must be flow proportional; either the time interval between each aliquot or the volume of each aliquot must be proportional to either the stream flow at the time of sampling or the total stream flow since the collection of the previous aliquot. Aliquots may be collected manually or automatically.

E. OTHER REQUIREMENTS

1. Schedule of Submission

   a. Effluent and Receiving Water Monitoring Programs

      (1) Effluent Monitoring Program

      The Permittee shall submit an Effluent Monitoring Program which complies with Part A of this permit to the Director for approval within 30 days after the effective date of this permit.

      (2) Receiving Water Monitoring Program

      The Permittee shall submit a Receiving Water Monitoring Program which complies with Part C.4 of this permit to the Director for approval within 30 days after the effective date of this permit.

      (3) The Programs(s) shall include at a minimum, but not be limited to the following:

      (A) Sampling location map;
      (B) Sample holding time;
      (C) Preservation techniques;
      (D) Test method and method detection level; and
      (E) Quality control measures.

      The Department reserves the right to require the Permittee to revise the approved program, as appropriate, pursuant toward compliance with the terms and conditions of this permit.

      Monitoring shall be conducted according to test procedures approved under 40 CFR 136 with detection limits low enough to measure the compliance with Parts A and C of this permit. For cases where the discharge limitation is below the lowest detection limit of the appropriate test procedure, the compliance shall be based upon the lowest detection limit of the method.

      If a test method has not been promulgated for a particular constituent, the Permittee may use any suitable method for measuring the level of the constituent in the discharge provided the Permittee submit a description of the method or a reference to a published method.

   b. The Permittee shall submit to the Director by January 30 of each year, an annual summary of the quantities of all chemicals, listed by both chemical and trade names, which are used for cooling and/or boiler water treatment and which are discharged.

   c. The Permittee shall submit an initial investigation TRE workplan in accordance with Part B.2.a to the Director and EPA Region 9 within 90 days after the effective date of the permit.

d. The Permittee shall submit a receiving water bottom biological communities monitoring program detailing the requirements in accordance with Part C.6 to the Director for approval within 60 days after the effective date of the permit.

e. Within 90 days after the effective date of this permit, the Permittee shall submit an updated SWPCP in accordance with Part A.2.a to the Director.

f. The Permittee shall submit the Section 316(a) Clean Water Act Assessment revised thermal effects monitoring program and reports in accordance with the schedule specified at Part E.2.b of this permit.

2. Section 316(a) Clean Water Act Assessment, Thermal Effects Report

a. The Permittee shall conduct an assessment toward addressing the thermal discharge requirements under Section 316(a) of the Clean Water Act, as amended. Pursuant toward completing this assessment the Permittee shall conduct a monitoring program to identify all impacts due to the thermal discharge. The Permittee shall describe the results and findings of the thermal effects monitoring program in a comprehensive assessment report (i.e., Thermal Effects Report). The Thermal Effects Report shall include:

(1) A complete description of all impacts due to the discharge as identified by the thermal effects monitoring program. This description shall include, among other things, vicinity maps showing all stations, period of sampling for each station, and data collected at each station.

(2) A complete description of the analytical approach used to describe the impacts due to the discharge. This shall include a description of the data sets to be analyzed, the types of analyses, and justification for the analytical approach used.

(3) A complete description of the thermal effects data <u>not</u> used in the analyses to describe the impacts due to the discharge, and the justification for not including the data. This description shall include a clear definition between qualitative and quantitative evaluations.

b. The final thermal effects report shall be developed and submitted to the Department and EPA Region 9 pursuant to the following schedule:

(1) The Permittee shall submit a revised thermal effects monitoring program no later than 120 days after the effective date of this permit. (Note: The proposed thermal effects program dated May 2001, shall be revised to incorporate additional program elements.)

(2) The Permittee shall submit the draft Thermal Effects Report by (3 years after effective date).

(3) The Permittee shall submit the final Thermal Effects Report by (3 ½ years after the effective date).

c. The DOH reserves the right to require the Permittee to revise the thermal effects monitoring program and Thermal Effects Report, as appropriate, pursuant toward compliance with the terms and conditions of this permit and Section 316(a) of the Clean Water Act, as amended.

d. This requirement may be waived by the Department, upon concurrence by EPA Region 9, if the Permittee successfully demonstrates that all objectives of and results associated with this requirement has been adequately addressed or completed in previously conducted reports and/or studies.

3. Schedule of Maintenance

The Permittee shall submit a schedule for approval by the Director at least 14 days prior to any maintenance of facilities, which might result in exceedance of effluent limitations. The schedule shall contain a description of the maintenance and its reason; the period of maintenance, including exact dates and times; and steps taken or planned to reduce, eliminate, and prevent occurrence of noncompliance.

4. Onshore or Offshore Construction

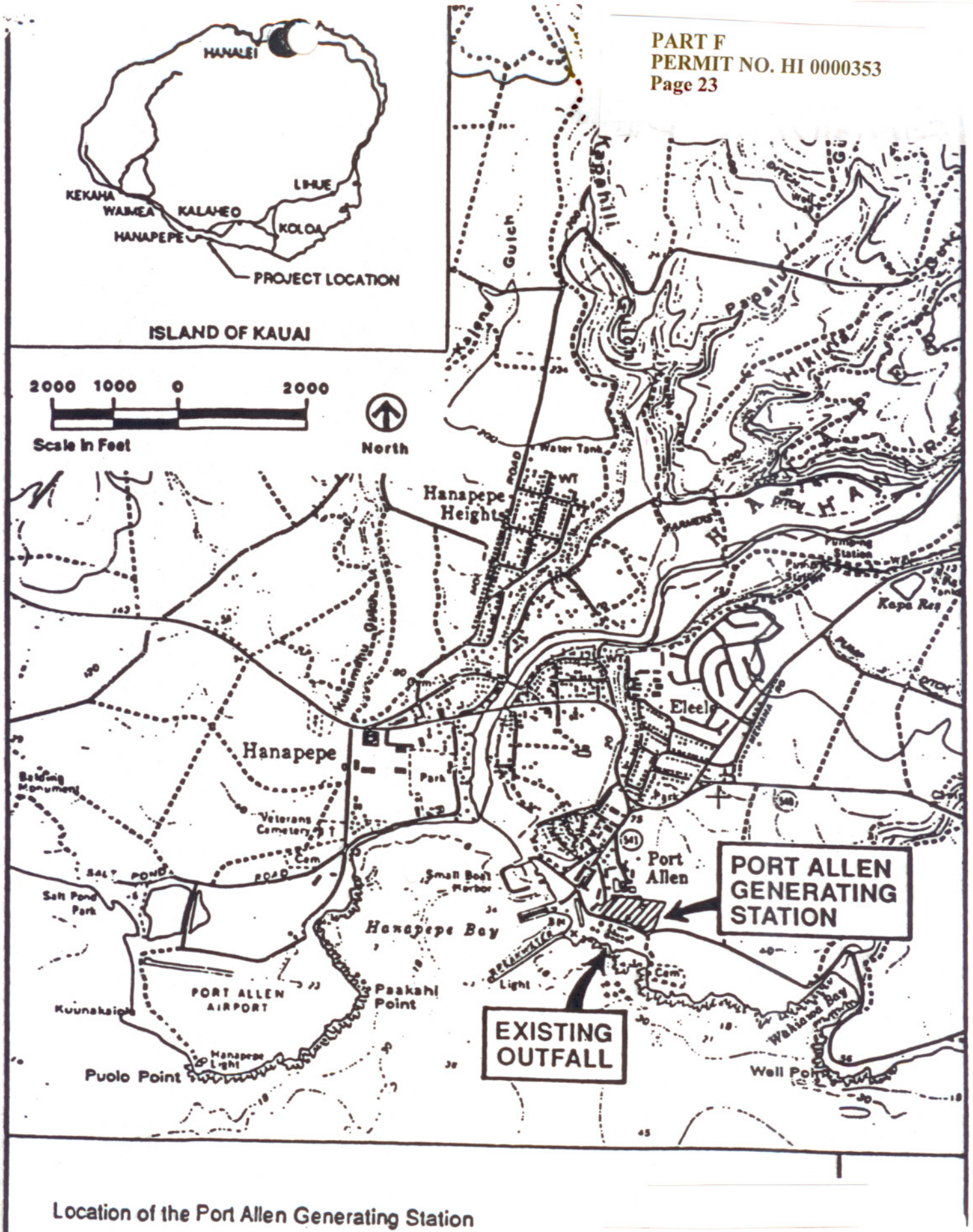
This permit does not authorize or approve the construction of any onshore or offshore physical structures or facilities or the undertaking of any work in any waters of the United States.

5. Remedy or Penalty

Nothing in this permit waives any remedy or penalty applicable under Hawaii Revised Statutes, Chapter 342D.

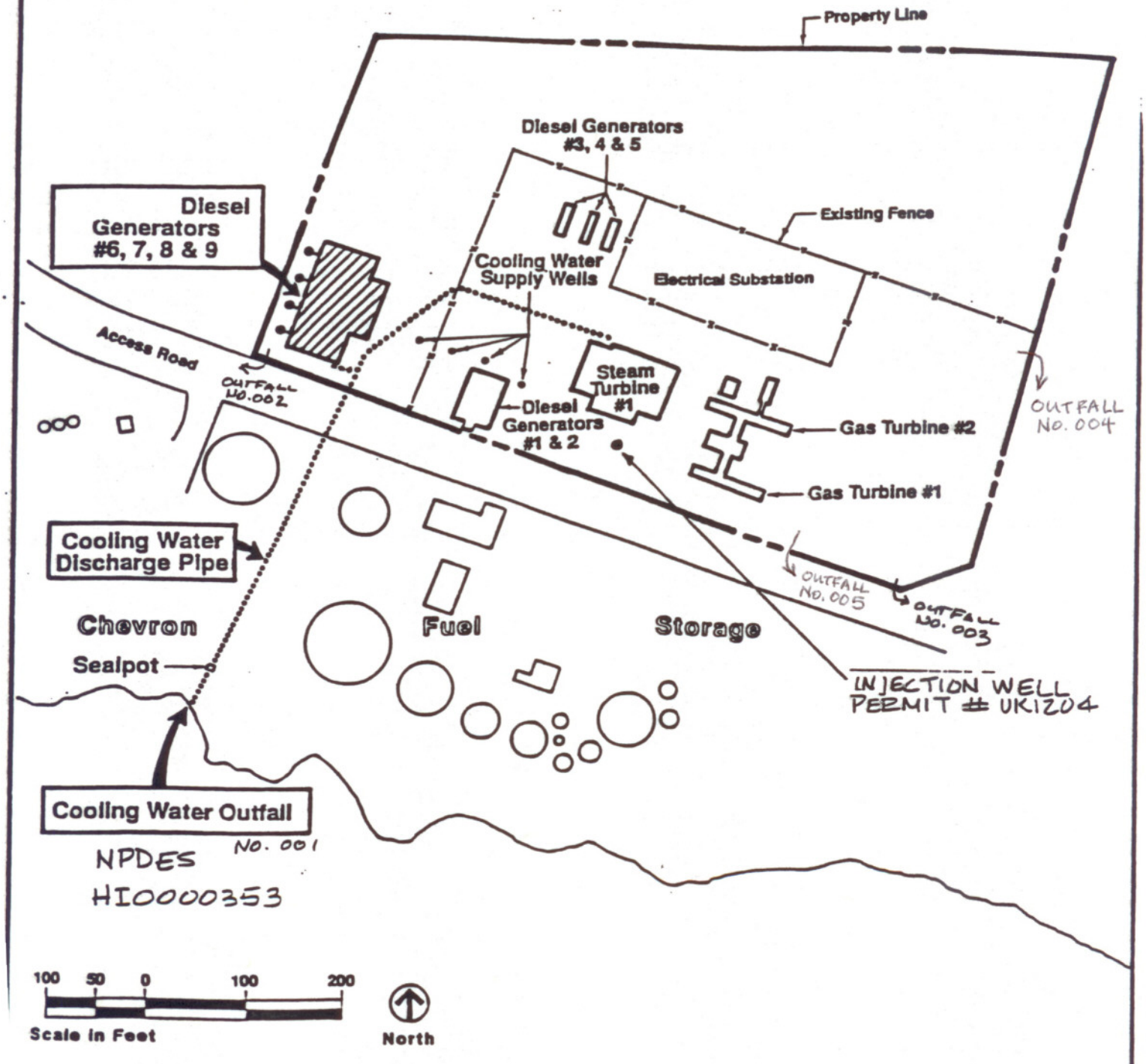
F. LOCATION AND ZONE OF MIXING MAPS

(See Figures 1, 2, and 3)



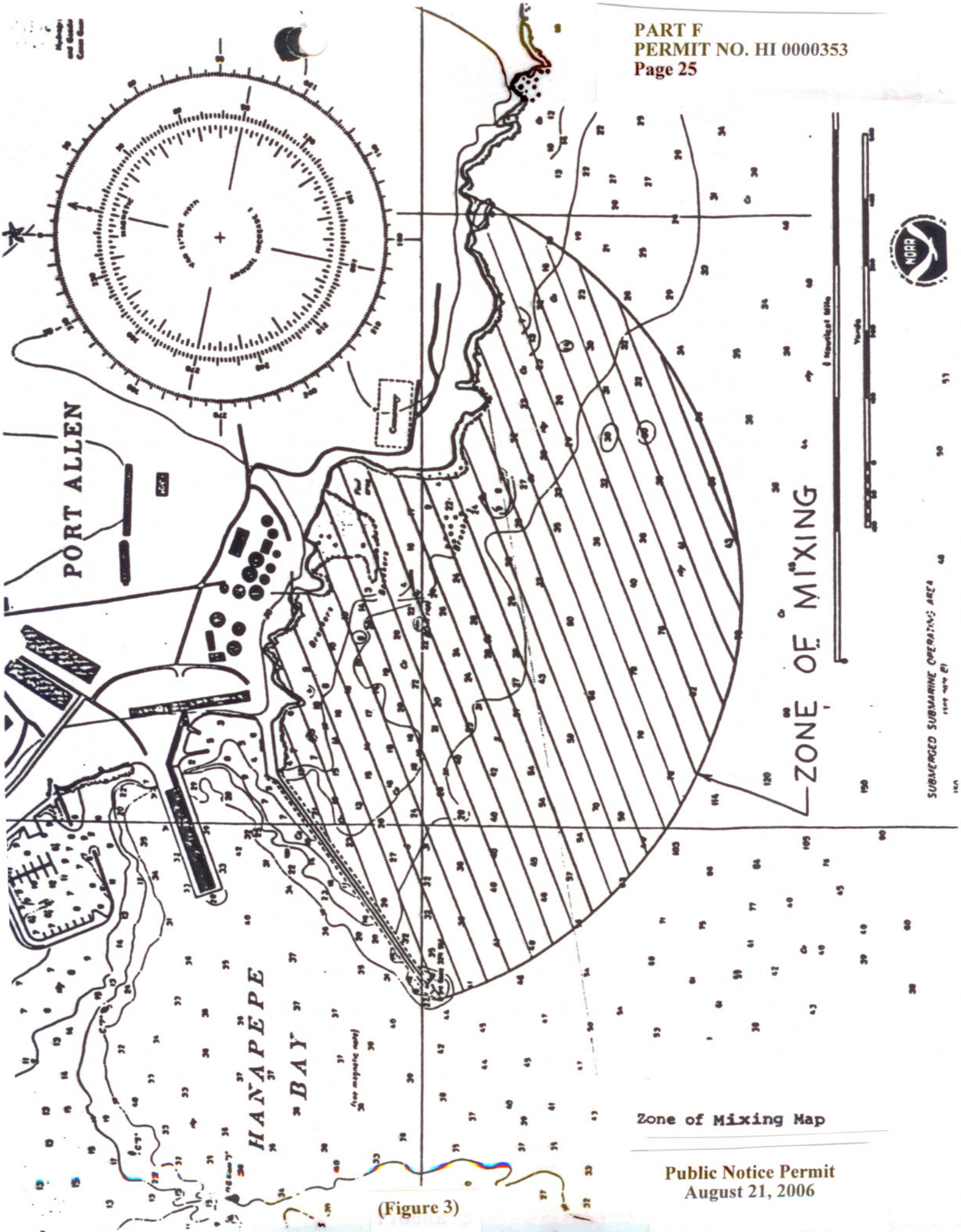
Location of the Port Allen Generating Station

FIGURE 1



Layout of the Port Allen Generating Station and Cooling Water Discharge Pipe

Figure 2



Zone of Mixing Map

(Figure 3)